



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

[Handwritten signature]

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/053,963	01/22/2002	Aron T. Lunde	37829.0400	5214
7590	03/05/2004			EXAMINER NGUYEN, KHIEM D
Deborah K. Henscheid, Esq. Snell & Wilmer, L.L.P. One Arizona Center 400 E. Van Buren Phoenix, AZ 85004-2202			ART UNIT 2823	PAPER NUMBER
DATE MAILED: 03/05/2004				

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)
	10/053,963	LUNDE, ARON T.
	Examiner	Art Unit
	Khiem D Nguyen	2823

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) Responsive to communication(s) filed on 15 December 2003.
- 2a) This action is FINAL. 2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) Claim(s) 1-27 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) Claim(s) _____ is/are allowed.
- 6) Claim(s) 1-27 is/are rejected.
- 7) Claim(s) _____ is/are objected to.
- 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on 22 January 2002 is/are: a) accepted or b) objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) The proposed drawing correction filed on _____ is: a) approved b) disapproved by the Examiner.
If approved, corrected drawings are required in reply to this Office action.
- 12) The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) All b) Some * c) None of:
1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) The translation of the foreign language provisional application has been received.
- 15) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- | | |
|--|--|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s). _____ . |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____ . | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Response to Amendment

Applicant's arguments filed December 15th, 2003 have been fully considered but they are not persuasive.

The Rejection from paper No. 3 sent August 15th, 2003 is incorporated in this paper. It is presented here for convenience.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1-27 are rejected under 35 U.S.C. 102(b) as being anticipated by Hubacher (U.S. Patent 5,554,940).

In re claims 1, 9, 14 and 22, Hubacher discloses a method for preparing a die on a wafer for testing by a testing apparatus, the method comprising, forming a die (FIG. 10: 10) on a wafer, the die having an active portion comprising integrated circuitry (col. 6, lines 38-64), wherein the die has a plurality of input bond pads (FIG. 10: 12) formed on the active portion; forming a plurality of test pads (FIG. 10: 28) on the die, the plurality of test pads accessible to the testing apparatus (col. 7, lines 31-42), at least one of the plurality of test pads corresponding to at least one of the plurality of input bond pads; forming a conductive path (FIG. 10: 36) between the at least one of the plurality of test pads and the at least one of the plurality of input bond pads, wherein a portion of the

conductive path is formed on the die outside of the active portion of the die; and testing the die by contacting the at least one of plurality of test pads with the testing apparatus (**FIG. 10: 50**).

In re claims 2, 10, 15, and 23, Hubacher discloses wherein the plurality of test pads (**FIG. 10, 28**) is formed on the active portion of the die (**FIG. 10: 10**).

In re claims 3, 11, 16, and 24, Hubacher discloses the active portion being surrounded by an inactive portion, wherein the conductive path extends from the at least one input bond pad to the inactive portion and from the inactive portion to the at least one test pad (col. 5, line 14 to col. 7, line 42 and **FIGS. 4-10**).

In re claims 4, 17, and 25, Hubacher discloses portion of the conductive path is formed on wafer outside of the die.

In re claims 5 and 18, Hubacher discloses severing the conductive path at a point outside of the active portion of the die (**FIGS. 4-10**).

In re claims 6 and 19, Hubacher discloses severing the conductive path at a point within the inactive portion (**FIGS. 4-10**).

In re claims 7 and 20, Hubacher discloses severing the conductive path at a point outside the die.

In re claims 8 and 13, Hubacher discloses wherein at least one test pad is of a sufficient size so as to be accessible by a testing apparatus (col. 7, lines 31-42).

In re claims 21 and 27, Hubacher discloses wherein at least one of the plurality of test pads (**FIG. 10, 28**) is larger in size than the at least one of the plurality of input bond pads (**FIG. 10: 34**).

In re claim 12, Hubacher discloses the die being surround by a non-conducting scribe area on the wafer, wherein the portion of the conductive path is formed on the non-conducting scribe area (col. 5, line 14 to col. 7, line 42 and FIGS. 4-10).

In re claim 26, Hubacher discloses wherein portion of each of the conductive lines is severed when the die is separated from the wafer.

Response to Amendment

Response to Applicant's Arguments

Applicant's arguments filed December 15th, 2003 have been fully considered but they are not persuasive.

In response to Applicant's argument that the Hubacher reference does not discloses a die assembly method wherein "a portion of the conductive path is formed on the die outside of the active portion of the die" as recited in the independent claims, examiner respectfully disagree. Applicant is directed to (col. 6, line 24 to col. 7, line 42 and FIGS. 7-11) where Hubacher discloses a die assembly method comprising a portion of the conductive path (FIG. 10: 36) between the input bond pad (FIG. 10: 12) and test pad (FIG. 10: 28) wherein a portion of the conductive path is formed on the die outside of the active portion of the die. Note that, as disclosed in FIG. 10 portion of the conductive path (FIG. 10: 36) is formed above and away from the active portion of the die (FIG. 10: 10). For this reason, examiner holds the rejection proper.

Conclusion

THIS ACTION IS MADE FINAL. Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Khiem D Nguyen whose telephone number is (571) 272-1865. The examiner can normally be reached on Monday-Friday (8:00 AM - 5:00 PM).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Olik Chaudhuri can be reached on (571) 272-1855. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 305-3432 for regular communications and (703) 305-3432 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0956.

K.N.
March 2, 2004



W. DAVID COLEMAN
PRIMARY EXAMINER